§ 97.207

Observatory or before changing the transmitting frequency, transmitter power, antenna height or directivity of an existing repeater, the station licensee must give notification thereof at least 20 days in advance of planned operation to the Interference Office, Arecibo Observatory, Post Office Box 995, Arecibo, Puerto Rico 00613, in writing or electronically, of the technical parameters of the proposal. Licensees who choose to transmit information electronically should e-mail prcz@naic.edu

- (1) The notification shall state the geographical coordinates of the antenna (NAD-83 datum), antenna height above mean sea level (AMSL), antenna center of radiation above ground level (AGL), antenna directivity and gain, proposed frequency and FCC Rule Part, type of emission, effective radiated power, and whether the proposed use is itinerant. Licensees may wish to consult interference guidelines provided by Cornell University.
- (2) If an objection to the proposed operation is received by the FCC from the Arecibo Observatory, Arecibo, Puerto Rico, within 20 days from the date of notification, the FCC will consider all aspects of the problem and take whatever action is deemed appropriate. The licensee will be required to make reasonable efforts in order to resolve or mitigate any potential interference problem with the Arecibo Observatory.

[54 FR 25857, June 20, 1989, as amended at 55 FR 4613, Feb. 9, 1990; 56 FR 32517, July 17, 1991; 58 FR 64385, Dec. 7, 1993; 59 FR 18975, Apr. 21, 1994; 62 FR 55536, Oct. 27, 1997; 63 FR 41205, Aug. 3, 1998]

§97.207 Space station.

- (a) Any amateur station may be a space station. A holder of any class operator license may be the control operator of a space station, subject to the privileges of the class of operator license held by the control operator.
- (b) A space station must be capable of effecting a cessation of transmissions by telecommand whenever such cessation is ordered by the FCC.
- (c) The following frequency bands and segments are authorized to space stations:

- (1) The 17 m, 15 m, 12 m, and 10 m bands, 6 mm, 4 mm, 2 mm and 1 mm bands; and
- (2) The 7.0-7.1 MHz, 14.00-14.25 MHz, 144-146 MHz, 435-438 MHz, 1260-1270 MHz, and 2400-2450 MHz, 3.40-3.41 GHz, 5.83-5.85 GHz, 10.45-10.50 GHz, and 24.00-24.05 GHz segments.
- (d) A space station may automatically retransmit the radio signals of Earth stations and other space stations.
- (e) A space station may transmit one-way communications.
- (f) Space telemetry transmissions may consist of specially coded messages intended to facilitate communications or related to the function of the spacecraft.
- (g) The licensee of each space station must give two written, pre-space station notifications to the Wireless Telecommunications Bureau, FCC, Washington, DC 20554. Each notification must be in accord with the provisions of Articles 11 and 13 of the Radio Regulations.
- (1) The first notification is required no less than 27 months prior to initiating space station transmissions and must specify the information required by Appendix 4 and Resolution No. 642 of the Radio Regulations.
- (2) The second notification is required no less than 5 months prior to initiating space station transmissions and must specify the information required by Appendix 3 and Resolution No. 642 of the Radio Regulations.
- (h) The licensee of each space station must give a written, in-space station notification to the Wireless Telecommunications Bureau, FCC, Washington, DC 20554, no later than 7 days following imitation of space station transmissions. The notification must update the information contained in the pre-space notification.
- (i) The licensee of each space station must give a written, post-space notification to the Wireless Telecommuncations Bureau, FCC, Washington, DC 20554, no later than 3 months after termination of the space

station transmissions. When the termination is ordered by the FCC, notification is required no later than 24 hours after termination.

[54 FR 25857, June 20, 1989, as amended at 54 FR 39535, Sept. 27, 1989; 56 FR 56171, Nov. 1, 1991; 57 FR 32736, July 23, 1992; 60 FR 50124, Sept. 28, 1995]

§ 97.209 Earth station.

- (a) Any amateur station may be an Earth station. A holder of any class operator license may be the control operator of an Earth station, subject to the privileges of the class of operator license held by the control operator.
- (b) The following frequency bands and segments are authorized to Earth stations:
- (1) The 17 m, 15 m, 12 m, and 10 m bands, 6 mm, 4 mm, 2 mm and 1 mm bands; and
- (2) The 7.0–7.1 MHz, 14.00–14.25 MHz, 144–146 MHz, 435–438 MHz, 1260–1270 MHz and 2400–2450 MHz, 3.40–3.41 GHz, 5.65–5.67 GHz, 10.45–10.50 GHz and 24.00–24.05 GHz segments.

[54 FR 25857, June 20, 1989, as amended at 54 FR 39535, Sept. 27, 1989]

§ 97.211 Space telecommand station.

- (a) Any amateur station designated by the licensee of a space station is eligible to transmit as a telecommand station for that space station, subject to the privileges of the class of operator license held by the control operator.
- (b) A telecommand station may transmit special codes intended to obscure the meaning of telecommand messages to the station in space operation.
- (c) The following frequency bands and segments are authorized to telecommand stations:
- (1) The 17 m, 15 m, 12 m and 10 m bands, 6 mm, 4 mm, 2 mm and 1 mm bands; and
- (2) The 7.0-7.1 MHz, 14.00-14.25 MHz, 144-146 MHz, 435-438 MHz, 1260-1270 MHz and 2400-2450 MHz, 3.40-3.41 GHz, 5.65-5.67 GHz, 10.45-10.50 GHz and 24.00-24.05 GHz segments.

(d) A telecommand station may transmit one-way communications.

[54 FR 25857, June 20, 1989, as amended at 54 FR 39535, Sept. 27, 1989; 56 FR 56171, Nov. 1, 1991]

§ 97.213 Telecommand of an amateur station.

An amateur station on or within 50 km of the Earth's surface may be under telecommand where:

- (a) There is a radio or wireline control link between the control point and the station sufficient for the control operator to perform his/her duties. If radio, the control link must use an auxiliary station. A control link using a fiber optic cable or another telecommunication service is considered wireline.
- (b) Provisions are incorporated to limit transmission by the station to a period of no more than 3 minutes in the event of malfunction in the control link.
- (c) The station is protected against making, willfully or negligently, unauthorized transmissions.
- (d) A photocopy of the station license and a label with the name, address, and telephone number of the station licensee and at least one designated control operator is posted in a conspicuous place at the station location.

[54 FR 25857, June 20, 1989, as amended at 56 FR 56171, Nov. 1, 1991]

§ 97.215 Telecommand of model craft.

An amateur station transmitting signals to control a model craft may be operated as follows:

- (a) The station identification procedure is not required for transmissions directed only to the model craft, provided that a label indicating the station call sign and the station licensee's name and address is affixed to the station transmitter.
- (b) The control signals are not considered codes or ciphers intended to obscure the meaning of the communication.
- (c) The transmitter power must not exceed $1\,\mathrm{W}_{\mathrm{c}}$

 $[54\ FR\ 25857,\ June\ 20,\ 1989,\ as\ amended\ at\ 56\ FR\ 56171,\ Nov.\ 1,\ 1991]$